

## **REMARKS/ARGUMENTS**

This amendment is filed in response to the Office Action Issued April 13, 2007, a response to which is due to be filed by July 13, 2007. Accordingly, the Applicants do not believe that any fees fall due as a result of this amendment and, in particular, extension of time fees. If the Applicants are mistaken, the Commissioner is hereby authorized to deduct any necessary fees from our Deposit Account No. 13-2400 in this and future replies.

As detailed above, by way of this amendment, the Applicants have amended claims 3-8, 13, and 17. Claim 18 has been cancelled, without prejudice to the subject matter contained therein. The amendments to claims 3-8 and 13 have been made to address the Examiner's objections to Informalities and objections under 35 U.S.C. § 112, 2<sup>nd</sup> paragraph, to missing antecedents. In the Applicants' respectful submission, remaining claims 1-17, as amended, comply with 35 U.S.C. § 112, 2<sup>nd</sup> paragraph.

In the Examiner's informal objections, the Examiner noted that claims 6 and 7 appear to be identical and that claims 14 and 15 appear to be identical. The Examiner suggested that one of each pair of claims ought be cancelled. With respect, the Applicants note that claims 6 and 7 are not identical; nor are claims 14 and 15. Claim 6 specifies a step of testing the cumulative data arrival rate  $R(n)$  against a rate threshold  $T_L$  specific to that precedence grade. Claim 7 specifies the step of testing the cumulative data arrival rate  $R(n)$  against a rate threshold  $T_L$  common to all precedence grades. It will be appreciated that claim 6 is directed to embodiments in which the rate threshold is specific to a precedence grade and claim 7 is directed to embodiments in which the rate threshold is common to all precedence grades. Accordingly, claims 6 and 7 are not of identical scope. A similar distinction is found in claims 14 and 15.

In the rejections under 35 U.S.C. § 112, 2<sup>nd</sup> paragraph, the Examiner took the position that claims 1, 9, 17, and 18 were vague and indefinite on the basis that certain variables were "not defined". The Examiner specifically identified the variables  $x$ ,  $n$  and controller gain  $K_i$ . With respect, the Applicants submit that these variables are well defined and would have a scope and meaning clearly understood by one of ordinary skill in the art. For example, the variable  $x$  is explicitly stated to be a nominal packet size in each of the identified claims. The variable  $n$  is specified as time, and is used as such in all expressions within the claims. One of ordinary skill in the art would have no difficulty understanding the scope and meaning of a variable  $n$  representing time. The variable  $K_i$  is specifically stated as being the stable interval controller gain for the data network. One of ordinary skill in the art would not have difficulty understanding the concept of stable interval controller gain, especially having regard to the detailed discussion of this variable within the specification. Accordingly, the Applicants respectfully submit that the variables used in independent claims 1, 9, and 17 are well defined and would be well understood within the meaning the 35 U.S.C. § 112, 2<sup>nd</sup> paragraph. The Examiner is respectfully requested to reconsider and withdraw this rejection.

Claims 17 and 18 were rejected under 35 U.S.C. § 101 as being directed to non-statutory subject matter. Claim 18 has been cancelled. Claim 17 has been amended to be put into a proper computer program product format. In the Applicants' respectful submission, claim 17 as amended, meets the requirements of 35 U.S.C. § 101.

The Office Action of April 13, 2007 included a rejection of claims 1, 3-9, and 11-18 on the basis of non-statutory obviousness-type double patenting over corresponding claims in co-pending Application No. 10/426,289. As an aside, it will be noted Application No. 10/426,289 names the same four individual inventors as the present application and both applications are assigned to a common assignee. The present application is a continuation-in-part of Application No. 10/426,289. The Applicants

respectfully traverse the Examiner's provisional double patenting rejection on the basis that the subject matter claimed in the claims of the present application is not obvious in view of co-pending Application No. 10/426,289.

In the rejection of claims 1 and 9 for obviousness-type double patenting, the Examiner notes that claim 1 of co-pending Application No. 10/426,289 discloses a number of the same method steps, but that claims 1 and 9 of the present application specify that the data arrival rate  $R(n)$  is a sum of the data arrival rates for a particular precedence grade under consideration plus the data arrival rates of all precedence grades with higher priority than the particular precedence grade. The Examiner purports to take official notice that summing one or more grade rates can be done in a similar manner.

Undoubtedly, the summing of two quantities is not, in and of itself, a new invention. However, co-pending Application No. 10/426,289 contains no teaching or suggestion of assigning precedence to packets and providing differential treatment to packets having different precedence grades in terms of determining the probability of dropping the packet. The present application describes a system and method for controlling data flow in which a plurality of precedence grades are specified each having a priority associated therewith. For each precedence grade, a cumulative data arrival rate is calculated, wherein the data arrival rate is the sum of data arrival rates for a particular precedence grade under consideration plus the data arrival rates of all precedence grades with a higher priority than the particular precedence grade under consideration. There is no teaching or suggestion of precedence, priority, or a cumulative calculation of data arrival rates in co-pending Application No. 10/426,289. Accordingly, the Applicants respectfully submit that independent claims 1 and 9 of the present application cannot be considered obvious in view of co-pending Application No. 10/426,289. Therefore, the Applicants respectfully traverse the Examiner's provisional obviousness-type double patenting rejection.

In view of the foregoing amendments and arguments, the Applicants respectfully request reconsideration and allowance of the present application. Should the Examiner have any questions with respect to these submissions, please contact Fraser Rowand at (416) 868-1482.

Respectfully Submitted,  
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